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REMARKS

This is intended as a full and complete response to the Office Action dated October 8, 2003, having a shortened statutory period for response set to expire on January 8, 2004. Please reconsider the claims pending in the application for reasons discussed below.

SPECIFICATION

Paragraphs 0034 and 0038 have been amended to correct minor errors.

CLAIM 5

Claim 5 has been amended to replace the delete the phrase "wherein the first direction is tangent to the concave face" to clarify the direction.

CLAIMS 6-10 and 21-23

Claims 6-10 and 21-23 have been amended to clearly identify the "body" as the "first body."

REJECTIONS

35 U.S.C. §112

Claims 1, 5, 9-13, 19, 22-24, 26, 32 and 35-36 stand rejected under 35 U.S.C. § 112 as the limitation "urge the substrate" is considered by the Examiner to be indefinite. Claim 17 stands rejected under 35 U.S.C. §112 as the limitation "a cooling plate move relative to the first axis" is considered by the Examiner to be indefinite. In response, the Applicants have amended claims 1, 5, 9-13, 17, 19, 22-24, 26, 32 and 35-36 accordingly to clarify the invention. Claims 2, 18, 28, 30, 33-34, and 36 have been amended to correct matters of form. Claims 4 and 21 have been amended to correct minor grammatical errors. The Applicants submit that the scope of the amended claims remains unchanged. These amendments are not presented to distinguish a reference, thus, the claims as amended are entitled to a full range of equivalents as not previously

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amended to distinguish a reference. Accordingly, the Applicants respectfully request the rejection be withdrawn.

35 U.S.C. §102(b) Claims 1-9, 11-16 and 28-36

Claims 1-9, 11-16 and 28-36 stand rejected under 35 U.S.C. § 102(b) as being anticipated by United States Patent No. 5,775,000 issued Jul. 7, 1998 to *Maekawa et al.*, (hereinafter referred to as "*Maekawa*"). The Applicants respectfully traverse the rejection.

Independent claim 1, as amended, recites limitations not taught, shown or suggested by *Maekawa*. *Maekawa* teaches a substrate gripper device where spring-biased swing fingers 16 hold a substrate S by engaging a top surface of the substrate and pushing the substrate down against a substrate rest 15. The substrate S is guided to the substrate rest 15 using slide plates 17 (Col. 3, lines 34-50, FIGS. 5-7). The substrate S is guided to the substrate rest 15 using slide plates 17. Once the substrate is centered by the slide plates 17, the swing fingers 16 rotate to clamp the substrate to the top surface of the rest 15. Thus, *Maekawa* teaches that the slide plates 15 move the substrate while the swing fingers 16 clamp the substrate after centering. Therefore, *Maekawa* does not teach or moving the substrate S laterally on the substrate rest 15 using any movable object, such as rotating pushers, to correct the orientation and position of the substrate placed thereon. As such, *Maekawa* does not teach, show or suggest an apparatus that includes a first pushing member radially coupled to a first body and adapted to move the substrate in a first direction parallel to a first side of a substrate support when the first body rotates, as recited in claim 1.

Independent claims 13, 32, and 36, as amended, recite similar subject matter, are patentable over *Maekawa* for the same reasons as stated with reference to claim 1. Moreover, claims 3, 5 recite limitations not taught or suggested by *Maekawa*. *Maekawa* does not teach or suggest a pushing member having two different rotational axis, as recited by claim 3. *Maekawa* does not teach or suggest a pushing member is adapted to move a substrate in a direction tangent to a concave face and parallel to a first side of a substrate support, as recited by claim 15. *Maekawa* does not teach or suggest pushing

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members, each having two perpendicularly orientated rotational axes, as recited by claim 13 and 18.

Thus, the Applicants submit that independent claim 1, 13, 32, and 36 and claims 2-9, 11-12, 14-16, 28-31, and 33-35 depending therefrom are patentable over *Maekawa*. Accordingly, the Applicants respectfully request the rejection be withdrawn.

35 U.S.C. §103 Claims 18-22 and 24-25

Claims 18-22 and 24-25 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over *Maekawa* in further view of United States Patent No. 5,636,960 issued Jun. 10, 1997 to *Hiroki et al.* (hereinafter referred to as "*Hiroki*"). The Applicants respectfully traverse the rejection.

Independent claim 18, as amended, recites limitations not taught, shown or suggested by *Maekawa* and *Hiroki*. The teachings of *Maekawa* have been discussed above. *Maekawa* does not teach or suggest pushing members, each having two perpendicularly orientated rotational axes or moving a substrate laterally on the substrate rest (support plate) to correct the orientation and position of the substrate placed thereon.

Hiroki teaches an apparatus having a buffer rack 80 where substrates may be aligned using diagonal positioners 86 (col. 6, line 46 – col. 7, line 12). The buffer rack 80 is in communication with a load lock chamber 30 of a vacuum processing apparatus (FIG. 1). *Hiroki* does not teach an apparatus comprising a pushing member having two perpendicular rotational axes and adapted to move the substrate.

Maekawa and *Hiroki* are not readily compatible as *Maekawa* teaches to clamp a single substrate while *Hiroki* teaches to align a plurality of substrate in a buffer before introducing one of the substrates into a processing system. At best, a combination of *Maekawa* and *Hiroki* would teach using the *Hiroki* alignment mechanism before clamping substrate with the swing fingers 16 of *Maekawa*. Thus, the combination would not yield a pushing member having two perpendicular rotational axes and adapted to move the substrate parallel to a substrate support plate, as recited by claim 18. As such, *Maekawa* and *Hiroki*, alone or in combination, would not produce the Applicants' invention.

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Thus, the Applicants submit that independent claim 18, and claims 19-22 and 24-25 depending therefrom are patentable over *Maekawa* in view of *Hiroki*. Accordingly, the Applicants respectfully request the rejection be withdrawn.

CONCLUSION


In conclusion, the references cited by the Examiner, alone or in combination, do not teach, show, or suggest the invention as claimed.

The secondary references made of record are noted. However, it is believed that the secondary references are no more pertinent to the Applicant's disclosure than the primary references cited in the office action. Therefore, the Applicants believe that a detailed discussion of the secondary references is not necessary for a full and complete response to this office action.

Having addressed all issues set out in the office action, the Applicants respectfully submit that the claims are in condition for allowance and respectfully request that the claims be allowed.

Respectfully submitted,

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